

ABSTRACT OF THE DISCLOSURE

Suction-assisted tissue-engaging devices, systems, and methods are disclosed that can be employed through minimal surgical incisions to engage tissue during a medical procedure through application of suction to the tissue through a suction member applied to the tissue. A shaft is introduced into a body cavity through a first incision, and a suction head is attached to the shaft via a second incision. The suction head is applied against the tissue by manipulation of the shaft and suction is applied to engage the tissue while the medical procedure is performed through the second incision. A system coupled to the shaft and a fixed reference point stabilizes the shaft and suction head. When the medical procedure is completed, suction is discontinued, the suction head is detached from the shaft and withdrawn from the body cavity through the second incision, and the shaft is retracted through the first incision.